



EOEA Habitat Restoration

Welcome to the Executive Office of Environmental Affairs (EOEA) habitat restoration web page. This page introduces readers to EOEA's habitat restoration efforts across Massachusetts and to the numerous restoration programs and projects supported by state agencies. For further information about habitat restoration in Massachusetts, please contact Hunt Durey at (617) 626-1245 / hunt.durey@state.ma.us or any of the individual program contacts listed below.

“Beyond Protection...” – EOEA is the principal state agency charged with maintaining the quality of the environment and protecting the natural resources of the Commonwealth. While existing laws and programs now protect or encourage preservation of many natural resources and landscapes, there is a clear need to go beyond protection and preservation – to restoration of our damaged natural habitats. Habitat restoration is an important and growing element of efforts to preserve our natural heritage and to protect and restore the critical “services” that the environment provides. In fact, the protection and restoration of critical land and water resources is a key recommendation of the [2004 Massachusetts Water Policy](#).

What is habitat restoration?

Restoration is broadly defined as the act, process, or result of returning a degraded or former habitat to a healthy, self-sustaining condition that resembles as closely as possible its pre-disturbed state. Examples of restoration include removing material from a filled wetland, increasing tidal flow to a restricted wetland, re-establishing natural river flow, enhancing degraded seafloor habitats, treating runoff to improve water quality, cleaning up contaminated habitats, and managing invasive species. Many projects involve multiple types of restoration and focus on improving the health of whole ecosystems. The goal of habitat restoration is to bring back lost habitat functions and values – or “services” – upon which our economy, safety, and overall quality of life depend.



Why is habitat restoration a priority?

Massachusetts has lost a significant percentage of its natural habitats to historic human impacts. Many of the Commonwealth's remaining habitats are degraded and offer diminished services to humans and wildlife. Some examples:



- Over one-third of our wetlands have been lost to filling and other alterations
- Thousands of acres of coastal marshes are impacted by restricted tidal flow
- Over 3,000 dams fragment and degrade our rivers and streams
- Numerous river basins are highly stressed due to lack of adequate water flow
- Ocean resources have been damaged and depleted
- Road and rail crossings alter wetland hydrology and impede fish and wildlife passage

- Habitats across the state are degraded by poor water quality and contamination
- Dozens of non-native species have invaded vast areas of our natural landscapes

These impacts translate into lost habitat services and a reduced quality of life for Massachusetts citizens. Whether protecting people from flooding, improving water quality, enhancing property values, supporting resource-based industry (e.g., fishing), providing recreation opportunities, or sustaining public water supplies, the natural habitats of Massachusetts offer immeasurable benefits to the public. When these benefits are diminished, people and communities suffer the consequences. Therefore, the Executive Office of Environmental Affairs places a high priority on efforts to restore natural habitats and the services they provide.

Recognizing the importance of restoration in the overall toolbox of environmental stewardship, EOEA supports a variety of programs and projects that focus on restoring critical natural habitats. Brief descriptions of each program are provided below, along with links to their respective web sites.

Who is involved?

Division of Marine Fisheries Restoration Projects

Recreational and Anadromous Fisheries Program

The Recreational and Anadromous Fisheries Program is responsible for the management and restoration of recreational and anadromous fish resources of the Commonwealth. Contact: Brad Chase (978) 282-0308 ext. 111 / brad.chase@state.ma.us.

Eelgrass Restoration Project

The eelgrass restoration program is underway in Boston Harbor to provide important shallow water eelgrass habitat to juvenile crustaceans, shellfish, and finfish which commonly inhabit sea grass meadows. Contact: Bruce Estrella (508) 563-1779, ext. 114 bruce.estrella@state.ma.us.

Bottom Sediment Enhancement Project

The goal of this project is to enhance key bottom sediments within Massachusetts Bay by building a rocky reef in order to provide habitat that is critical to several life stages of commercially important species such as American lobster, winter flounder, sea scallops, sea urchins, Atlantic cod, and numerous other species of fish and invertebrates. Contact: Bruce Estrella (508) 563-1779, ext. 114 bruce.estrella@state.ma.us.



Lakes and Ponds Program, Department of Conservation and Recreation

The Lakes and Ponds Program works with local groups and municipalities to protect, manage, and restore these valuable aquatic resources. Contact: Jim Straub (617) 626-1411 / jim.straub@state.ma.us.

Natural Heritage and Endangered Species, Division of Fisheries and Wildlife

The Natural Heritage & Endangered Species Program (NHESP) is responsible for the conservation and protection of Massachusetts' biodiversity including the species officially listed as Endangered, Threatened, or of Special Concern under the Massachusetts Endangered Species Act. NHESP operates the Ecological Restoration Program that supports restoration efforts in a variety of habitat types. Contact: Tim Simmons (508) 792-7270 ext.126 / tim.simmons@state.ma.us.

Natural Resource Damages Assessment and Restoration, EOEA

The Secretary of EOEA is designated by the Governor as Trustee for natural resources of the Commonwealth. As Trustee, the Secretary has the authority under state and federal environmental statutes to bring an action or claim for liability against a responsible party for natural resource damages (NRD) resulting from a release or threat of release of oil or hazardous substances. The NRD process

generally includes injury assessment / quantification, damage determination, and restoration planning / implementation to restore, replace, or acquire the equivalent of the injured resources. The overall goal of NRD is to restore injured resources to functional ecological systems, and may also include compensation to the public for the lost use (including human use) of the injured resource from onset of injury to completion of restoration. Contact: Dale Young (617) 626-1134 / dale.young@state.ma.us or Tanya Baker (617) 626-1082 / tanya.baker@state.ma.us.

Riverways Program, Department of Fish and Game

The mission of the Riverways Program is to promote the restoration and protection of the ecological integrity of the Commonwealth's watersheds: rivers, streams, and adjacent lands. The program works to restore degraded riparian and in-stream habitats using a community based approach.

Restoration techniques include restoring natural river flow levels and eliminating impediments to the movement of fish, wildlife, and other aquatic organisms through dam removal, culvert upgrades, stream daylighting, and natural channel modifications. Contact Joan Kimball (617) 626-1544 joan.kimball@state.ma.us.



Wetlands Restoration Program, Office of Coastal Zone Management

The mission of the Wetlands Restoration Program (WRP) is to help people voluntarily restore the state's degraded and former coastal wetlands and the services they provide. The program serves as a facilitator of restoration – working to identify new projects, organize project teams, provide technical assistance, secure project funding, and help manage and coordinate restoration activities from start to finish. Founded on a strong partnership model, the program works with many federal, state, and local partners to complete restoration projects. WRP also funds technical services and a grants program to help partners achieve their restoration goals. Contact: Hunt Durey (617) 626-1245 / hunt.durey@state.ma.us.



Restoration Coordination

EOEA Habitat Restoration Network

Established in 2005, the EOEA Habitat Restoration Network is an informal collaboration between EOEA restoration programs that fosters the sharing of information, experiences, and expertise to advance the science, policy, and practice of habitat restoration in the Commonwealth. Representatives from EOEA agencies and programs involved in restoration meet quarterly and communicate regularly through a habitat restoration listserv.



Partnership to Restore Massachusetts Aquatic Habitats

The Partnership was originally founded in the mid-1990s to support wetland restoration efforts across Massachusetts. In 2005, representatives agreed to broaden the Partnership to include all types of aquatic habitats and to expand the membership to all state programs involved in aquatic habitat restoration. Partners consist of

state and federal restoration and regulatory programs, CWRP, and several non-profit conservation groups. The Partnership meets twice per year and coordinates on existing and new projects, funding needs and opportunities, regulatory and policy issues, and other items as needed.

Public-Private Partnerships

Massachusetts Corporate Wetlands Restoration Partnership (CWRP)

Although not a state program, the CWRP is closely affiliated with EOEA restoration efforts and provides significant support for aquatic habitat restoration across the Commonwealth. Based on a model of public-private partnerships that is strongly encouraged by EOEA, the CWRP is a non-profit organization that works to generate donations of funds and technical services from private companies that help advance aquatic habitat restoration projects. Donations often serve as critical non-federal match for federal agency restoration grants. Contact: Susan Redlich (617) 287-5568 / susan.redlich@umb.edu.



Regional Habitat Restoration

Gulf of Maine Council on the Marine Environment

The Gulf of Maine Council is an international body with representatives from Massachusetts, New Hampshire, Maine, New Brunswick, and Nova Scotia. Its mission is to maintain and enhance environmental quality in the Gulf of Maine (Cape Cod Bay to Nova Scotia) and to allow for sustainable resource use by existing and future generations. The Council pursues this mission by guiding and supporting research, management, and habitat restoration activities in the Gulf of Maine, and by fostering cross-border cooperation among government, non-government, academic and private groups.

